



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/037,242	11/09/2001	Victoria E. Milton	209332	6648
23460 7.	590 02/07/2005		EXAMINER	
LEYDIG VOIT & MAYER, LTD TWO PRUDENTIAL PLAZA, SUITE 4900			BONSHOCK, DENNIS G	
180 NORTH STETSON AVENUE		5 4900	ART UNIT	PAPER NUMBER
CHICAGO, IL	. 60601-6780		2173	

DATE MAILED: 02/07/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)				
Office Action Summan	10/037,242	MILTON ET AL.				
Office Action Summary	Examiner	Art Unit				
	Dennis G. Bonshock	2173				
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	orrespondence address				
A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	36(a). In no event, however, may a reply be time within the statutory minimum of thirty (30) days will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE	ely filed swill be considered timely. the mailing date of this communication. O (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 21 October 2004.						
2a)⊠ This action is <b>FINAL</b> . 2b)☐ This	This action is <b>FINAL</b> . 2b) This action is non-final.					
3) Since this application is in condition for allowar	3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims	·	•				
4)⊠ Claim(s) <u>1-48</u> is/are pending in the application.						
4a) Of the above claim(s) is/are withdrawn from consideration.						
5) Claim(s) is/are allowed.						
6)⊠ Claim(s) <u>1-48</u> is/are rejected.	6)⊠ Claim(s) <u>1-48</u> is/are rejected.					
7) Claim(s) is/are objected to.	7) Claim(s) is/are objected to.					
8) Claim(s) are subject to restriction and/or	r election requirement.					
Application Papers						
9) The specification is objected to by the Examiner.						
10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11)☐ The oath or declaration is objected to by the Ex	aminer. Note the attached Office	Action or form PTO-152.				
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of:						
1. Certified copies of the priority documents have been received.						
2. Certified copies of the priority documents have been received in Application No						
3. Copies of the certified copies of the priority documents have been received in this National Stage						
application from the International Bureau (PCT Rule 17.2(a)).  * See the attached detailed Office action for a list of the certified copies not received.						
Oce the attached detailed Office action for a list	or the definited copies not receive	<b>u</b> .				
Attachment(s)						
1) Notice of References Cited (PTO-892)	4) Interview Summary	(PTO-413)				
2) Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail Da	ite				
3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  Paper No(s)/Mail Date	5) Notice of Informal P 6) Other:	atent Application (PTO-152)				

Art Unit: 2173

## Final Rejection

#### Response to Amendment

1. It is hereby acknowledged that the following papers have been received and placed on record in the file: Amendment as received on 10-21-2004.

2. Claims 1-48 have been examined.

Status of Claims:

- 3. Claims 1-11, 15-29, 33-43, 47, and 48 are rejected under 35 U.S.C. 103(a) as being unpatentable over Understanding Universal Plug and Play, hereinafter MS and XML Schema Part 0: Primer, hereinafter W3C.
- 4. Claims 12-14, 30-32, and 44-46, are rejected under 35 U.S.C. 103(a) as being unpatentable over MS, W3C, and Dubal et al., Patent #6,711,630, hereinafter Dubal.

#### Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 1-11, 15-29, 33-43, 47, and 48 are rejected under 35 U.S.C. 103(a) as being unpatentable over Understanding Universal Plug and Play, hereinafter MS and XML Schema Part 0: Primer, hereinafter W3C.
- 3. With regard to claim 1, MS teaches, on page 1, paragraphs 1-4 and page 11, paragraph 4, the use of Universal Plug and play for providing a user with a set of device descriptions and list of associated device services, which allow for selective retrieval of

Page 3

Art Unit: 2173

service descriptions, and allow for invoking the actions. MS teaches, on pages 28 and page 30, that the vendor only presents categories available, and where the user selects which category to be implemented, such as the clock set application that the user selects to implement, thereby transmitting only this category of information from the control point. MS further teaches, on page 16, paragraph 4, the use of the XML Schema as defined by W3C. W3C teaches the XML Schema as used by MS, but further teaches, on page 23, paragraph3, that the XML Schema enables groups of elements (categories) be defined and named. It would have been obvious to one of ordinary skill in the art, having the teachings of MS and W3C before him at the time the invention was made to modify the UPnP of MS to include the grouping of elements, as did W3C. One would have been motivated to make such a combination because this allows for like elements to be partitioned for use alone, and away from the rest of the group.

- 4. With regard to claims 2, 8, 16, 24, 34, and 40, which teach the information presentation appliance conforming to a Universal Plug and Play device architecture, MS, further teaches, on page 1, paragraphs 1-4, the use of the Universal Plug and Play architecture.
- 5. With regard to claims 3, 9, 20, 28, 36, and 42, which teach the markup language being text based, MS, further teaches, on page 11, paragraph 2, the use of XML which is known in the art to be a text based markup language (see attached definition).
- 6. With regard to claim 4, 21, and 37, which teaches the markup language identifies an element with a tag, and wherein the tag is defined in a schema, MS, further teaches,

Art Unit: 2173

on page 11, paragraph 2, the use of XML which is known in the art to allow for custom tags to offer greater flexibility in organizing and presenting information (see attached definition).

- 7. With regard to claims 5, and 10, which teach information presented by the information presentation appliance is and audio information, MS further teaches, on page 1, paragraph 5, the use of UPnP for audio/video entertainment.
- 8. With regard to claims 6, and 11, which teach the information presented by the information presentation appliance is video information, MS further teaches, on page 1, paragraph 5, the use of UPnP for audio/video entertainment.
- 9. With regard to claim 7, MS teaches, on page 1, paragraphs 1-4 and page 11, paragraph 4, the use of Universal Plug and Play for providing a user with a set of device descriptions, each conveying its capabilities, and list of associated device services, which allow for selective retrieval of service descriptions, and allow for invoking the actions. MS teaches, on pages 28 and page 30, that the vendor only presents categories available, and where the user selects which category to be implemented, such as the clock set application that the user selects to implement, thereby transmitting only this category of information from the control point. MS further teaches, on page 16, paragraph 4, the use of the XML Schema as defined by W3C. W3C teaches the XML Schema as used by MS, but further teaches, on page 23, paragraph3, that the XML Schema enables groups of elements (categories) be defined and named. It would have been obvious to one of ordinary skill in the art, having the teachings of MS and W3C before him at the time the invention was made to modify the UPnP of MS to include the

Art Unit: 2173

grouping of elements, as did W3C. One would have been motivated to make such a combination because this allows for like elements to be partitioned for use alone, and away from the rest of the group.

Page 5

With regard to claim 15, MS teaches, on page 1, paragraphs 1-4 and page 11, 10. paragraph 4, the use of Universal Plug and play for providing a user with a set of device descriptions and list of associated device services, which allow for selective retrieval of service descriptions, and allow for invoking the actions. MS further teaches on page 20, paragraph 2, the user being able to control, implying some sort of input device. MS teaches, on pages 28 and page 30, that the vendor only presents categories available, and where the user selects which category to be implemented, such as the clock set application that the user selects to implement, thereby transmitting only this category of information from the control point. MS further teaches, on page 16, paragraph 4, the use of the XML Schema as defined by W3C. W3C teaches the XML Schema as used by MS, but further teaches, on page 23, paragraph3, that the XML Schema enables groups of elements (categories) be defined and named. It would have been obvious to one of ordinary skill in the art, having the teachings of MS and W3C before him at the time the invention was made to modify the UPnP of MS to include the grouping of elements, as did W3C. One would have been motivated to make such a combination because this allows for like elements to be partitioned for use alone, and away from the rest of the group.

Art Unit: 2173

11. With regard to claims 17, 25, 35, and 41, which teach the information presentation appliance is an electronic picture frame, MS further teaches, on page 1, paragraph 4, the user of UPnP in electronic imaging.

- 12. With regard to claims, 18 and 26, which teach the information presentation appliance being a speaker, MS further teaches, on page 1, paragraph 5, the use of UPnP for audio/video entertainment.
- 13. With regard to claims 19 and 27, which teach the information presentation appliance is a decoder device, MS further teaches, on page 1, paragraph 4, the use of UPnP in intelligent appliances, and PCs of all form factors.
- 14. With regard to claims 22 and 38, which teach the categories of information in the device description page are identified with extended tags, and wherein the extended tags are defined in an extended schema, MS, further teaches, on page 11, paragraph 2, the use of XML which is known in the art to allow for custom tags to offer greater flexibility in organizing and presenting information (see attached definition).
- 15. With regard to claim 23, MS teaches, on page 1, paragraphs 1-4 and page 11, paragraph 4, the use of Universal Plug and Play for providing a user with a set of device descriptions, each conveying its capabilities, and list of associated device services, which allow for selective retrieval of service descriptions, and allow for invoking the actions. MS further teaches on page 20, paragraph 2, the user being able to control, implying some sort of input device. MS teaches, on pages 28 and page 30, that the vendor only presents categories available, and where the user selects which category to be implemented, such as the clock set application that the user selects to implement,

Art Unit: 2173

thereby transmitting only this category of information from the control point. MS further teaches, on page 16, paragraph 4, the use of the XML Schema as defined by W3C. W3C teaches the XML Schema as used by MS, but further teaches, on page 23, paragraph3, that the XML Schema enables groups of elements (categories) be defined and named. It would have been obvious to one of ordinary skill in the art, having the teachings of MS and W3C before him at the time the invention was made to modify the UPnP of MS to include the grouping of elements, as did W3C. One would have been motivated to make such a combination because this allows for like elements to be partitioned for use alone, and away from the rest of the group.

Page 7

- 16. With regard to claims 29 and 43, which teach the available categories of information include the selected categories of information, W3C teaches, on page 23, paragraph 3, the XML Schema enabling groups of elements to be defined and given a name, where the available categories are made available by the peers of the peer to peer sharing system of MS.
- 17. With regard to claim 33, MS teaches, on page 1, paragraphs 1-4 and page 11, paragraph 4, the use of Universal Plug and play for providing a user with a set of device descriptions and list of associated device services, which allow for selective retrieval of service descriptions, and allow for invoking the actions. MS teaches, on pages 28 and page 30, that the vendor only presents categories available, and where the user selects which category to be implemented, such as the clock set application that the user selects to implement, thereby transmitting only this category of information from the control point. MS further teaches, on page 16, paragraph 4, the use of the XML

Art Unit: 2173

Schema as defined by W3C. W3C teaches the XML Schema as used by MS, but further teaches, on page 23, paragraph3, that the XML Schema enables groups of elements (categories) be defined and named. It would have been obvious to one of ordinary skill in the art, having the teachings of MS and W3C before him at the time the invention was made to modify the UPnP of MS to include the grouping of elements, as did W3C. One would have been motivated to make such a combination because this allows for like elements to be partitioned for use alone, and away from the rest of the group.

18. With regard to claim 39, MS teaches, on page 1, paragraphs 1-4 and page 11, paragraph 4, the use of Universal Plug and Play for providing a user with a set of device descriptions, each conveying its capabilities, and list of associated device services, which allow for selective retrieval of service descriptions, and allow for invoking the actions. MS teaches, on pages 28 and page 30, that the vendor only presents categories available, and where the user selects which category to be implemented, such as the clock set application that the user selects to implement, thereby transmitting only this category of information from the control point. MS further teaches, on page 16, paragraph 4, the use of the XML Schema as defined by W3C. W3C teaches the XML Schema as used by MS, but further teaches, on page 23, paragraph3, that the XML Schema enables groups of elements (categories) be defined and named. It would have been obvious to one of ordinary skill in the art, having the teachings of MS and W3C before him at the time the invention was made to modify the UPnP of MS to include the grouping of elements, as did W3C. One would have been motivated to make such a

Art Unit: 2173

combination because this allows for like elements to be partitioned for use alone, and away from the rest of the group.

- 19. With regard to claims 47 and 48, which teach receiving user input at the information presentation appliance, MS further teaches, on page 30, paragraphs 1-5, the user clicking on a clock set application showing the use of an input device, from his laptop control point, and further on page 32, paragraph 3, the pressing of a mood control button, that effects several devices in the network.
- 20. Claims 12-14, 30-32, and 44-46, are rejected under 35 U.S.C. 103(a) as being unpatentable over MS, W3C, and Dubal et al., Patent #6,711,630, hereinafter Dubal.
- 21. With regard to claims 12, 30, and 44, MS and W3C teach the UPnP system using XML groupings as discussed above, but fail to disclose using pointers to access the service description information. Dubal teaches, in column 1, line 65 through column 2, line 11, a system for providing plug and play functionality in an audio and video system, similar to that of MS and W3C, but further teaches the use of a pointer to the device object. It would have been obvious to one of ordinary skill in the art, having the teachings of MS, W3C, and Dubal, before him at the time the invention was made to modify UPnP of MS and W3C, to include the functionality of a pointer system in accessing select categories of information. One would have been motivated to make such a combination because pointers, variables that contain memory locations, are an efficient means of accessing data.
- 22. With regard to claims 13, 31, and 45, MS and W3C teach the UPnP system using XML groupings as discussed above, but fail to disclose using pointers to a list function

Art Unit: 2173

to access the service description information. Dubal teaches, in column 1, line 65 through column 2, line 11, a system for providing plug and play functionality in an audio and video system, similar to that of MS and W3C, but further teaches the use of a pointer to a list to the device object. It would have been obvious to one of ordinary skill in the art, having the teachings of MS, W3C, and Dubal, before him at the time the invention was made to modify UPnP of MS and W3C, to include the functionality of a pointer system in accessing select categories of information. One would have been motivated to make such a combination because connecting nodes by pointers is an efficient means of accessing data.

23. With regard to claims 14, 32, and 46, MS and W3C teach the UPnP system using XML groupings, that have associated names as discussed above, but fail to disclose using pointers to a list function to access the service description information. Dubal teaches, in column 1, line 65 through column 2, line 11, a system for providing plug and play functionality in an audio and video system, similar to that of MS and W3C, but further teaches the use of a pointer to a list to the device object. It would have been obvious to one of ordinary skill in the art, having the teachings of MS, W3C, and Dubal, before him at the time the invention was made to modify UPnP of MS and W3C, to include the functionality of a pointer system in accessing select categories of information. One would have been motivated to make such a combination because connecting nodes by pointers (a linked list) is an efficient means of accessing data.

Art Unit: 2173

## Response to Arguments

24. The arguments filed on 10-21-2004 have been fully considered but they are not persuasive. Reasons set forth below.

- 25. The applicants' argue that neither MS nor W3C teach creating a device description page that stores categories of information to be presented based on user input, and that rather the vendor controls the type of information being presented.
- 26. In response, the examiner respectfully submits that MS teaches, on pages 28 and page 30, that the vendor only presents categories available, and where the user selects which category to be implemented, such as the clock set application that the user selects to implement, thereby transmitting only this category of information from the control point. This is similar to the teachings of the applicant in the specification on page 6, lines 3-11. The W3C reference further shows XML Schema providing constraints that apply to groups of elements.
- 27. The applicants' argue that neither MS nor W3C teach an input device for selecting categories of information.
- 28. In response, the examiner respectfully submits that MS teaches, on page 30, paragraph 4, the user clicking on a clock set application showing the use of an input device, and further on page 32, paragraph 3, the pressing of a mood control button, that effects several devices in the network.

Art Unit: 2173

#### Conclusion

29. THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

- 30. A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.
- 31. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dennis G. Bonshock whose telephone number is (571) 272-4047. The examiner can normally be reached on Monday Friday, 6:30 a.m. 4:00 p.m.
- 32. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Cabeca can be reached on (571) 272-4048. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 2173

33. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

you have questions on access to the Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free).

1-27-05 dgb JOHN CABECA
PERVISORY PATENT EXAMP
TECHNOLOGY CENTER 2

Page 13